CLAIMS

1. A composition based on zirconium oxide comprising cerium oxide in an atomic ratio Zr/Ce > 1, and in addition comprising lanthanum oxide and an oxide of a rare earth other than cerium and lanthanum, characterized in that after calcination for 6 hours at 1150°C it has a specific surface of at least 10 m^2/g.

2. The composition as claimed in claim 1, characterized in that after calcination for 6 hours at 1150°C it has a specific surface of at least 15 m^2/g.

3. The composition as claimed in claim 1 or 2, characterized in that after calcination for 6 hours at 1200°C it has a specific surface of at least 3 m^2/g.

4. The composition as claimed in one of the preceding claims, characterized in that after calcination for 6 hours at 900°C it has a specific surface of at least 50 m^2/g, and more particularly of at least 70 m^2/g.

5. The composition as claimed in one of the preceding claims, characterized in that after calcination for 6 hours at 1000°C it has a specific surface of at least 40 m^2/g.

6. The composition as claimed in one of the preceding claims, characterized in that the rare earth is neodymium.

7. The composition as claimed in one of the preceding claims, characterized in that the contents by weight of oxides are at least 50% for zirconium,

less than 50% for the oxide of cerium, 5% at most for lanthanum and 15% at most for the rare earth.

8. The composition as claimed in one of the preceding claims, characterized in that it is sulfur-free.

9. A method of preparation of a composition as claimed in one of the preceding claims, characterized in that it comprises the following stages:
- a mixture is prepared comprising compounds of cerium, of lanthanum and of the aforementioned rare earth and a sol of a zirconium compound;
- said mixture is brought into contact with a solution of a basic compound whereby a precipitate is obtained;
- said precipitate is heated in an aqueous medium;
- the precipitate thus obtained is calcined.

10. The method as claimed in claim 9, characterized in that it uses a sol of a zirconium compound that was obtained by heat treatment of an aqueous solution of a zirconium oxychloride.

11. The method as claimed in claim 9, characterized in that it uses a sol of a zirconium compound that was obtained by the action of nitric acid on a hydroxide or carbonate of zirconium in a molar ratio NO_3^-/Zr between 1.7 and 2.3 in the case of a hydroxide and 1.7 and 2 in the case of a carbonate.

12. The method as claimed in one of claims 9 to 11, characterized in that the precipitate is heated at a temperature of at least 100°C.

13. The method as claimed in one of claims 9 to 11, characterized in that heating of the precipitate is carried out at basic pH.

14. The method as claimed in one of claims 9 to 12, characterized in that the aforementioned mixture is

brought into contact with the solution of a basic compound by introducing said mixture into this solution.

15. A catalytic system, characterized in that it comprises a composition as claimed in one of claims 1 to 8.

16. A method of treatment of the exhaust gases of internal combustion engines, characterized in that a catalytic system as claimed in claim 15 or a composition as claimed in one of claims 1 to 8 is used as the catalyst.